

begin

# 362

A handwritten scribble consisting of several overlapping loops, resembling a stylized signature or a decorative flourish, located below the number '362'.

INCSHM

Droshnikov, P. . "New data for the stratigraphy of the left bank of the Don River," Uchenye zapiski (Rost. n/2 gos. un-ta im. Volodav), Vol. XI, 1948, p. 45-47, with tables- Biblio: 11 items

SC: U-3566, 15 March, 53, (Letopis' zhurnal'nykh stat'ey, No. 14, 1953)

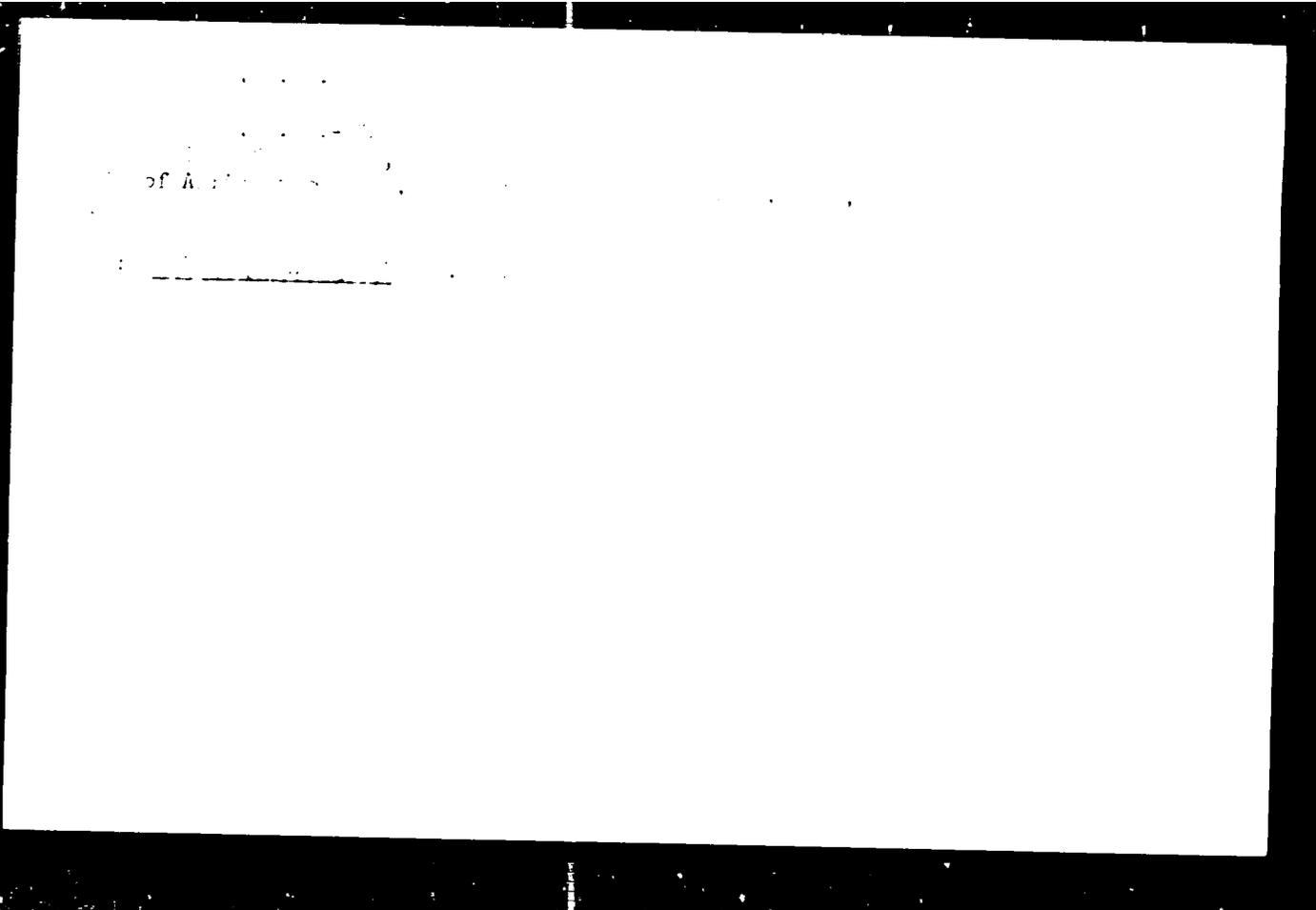
MART'YANOV, Yu.A., gornyy inzh.; MIROSHNIKOV, P.V., gornyy inzh.

Use of a hydraulic cyclone with a magnetic coil in the crushing  
cycle. Gor. zhur. no.9:65-66 S '62. (MIRA 19:9)

1. Institut Kazmekhanobr, Alma-Ata.  
(Separators (Machines))

MIROSHNIKOV, V. I. inzh.

Unit and section number for the  
motor vehicles is in addition. Attached . . .



ZAYTSEV, I.F.; VDOVIN, D.I.; ONEDOV, N.P.; BLAGOV, I.S.; ZIMASKOV, V.A.;  
KOTKIN, A.M.; LEKHTSIYER, I.S.; MIROSHNIKOV, V.G.; OSYKIN, V.T.

Separator for dressing lump material. Gor. zhur no.4:76 Ap '63.

(MI.A 16:4)

(Separators (Machines))

MIRO ENERW, V. M. ...

Evaluation of the possibility of the operation of a circuit with  
composition of an industrial scale steam medium. ...

1. Test ...

L 51871-65 EWP(a)/EWT(m)/EPP(c)/EMA(d)/EWP(t)/EWP(k)/EWP(z)/EWP(b) PF-4/Pad  
ACCESSION NR. AP5008271 IJP(c) JL/HW/WE S/0226/65/000/003/0035/0041

AUTHORS: Fedorchenko, I. M.; Denisenko, E. T.; Miroshnikov, V. N. 31  
30

TITLE: Study of the scaling resistance of some nickel materials. Communication 1

SOURCE: Poroshkovaya metallurgiya, no. 3, 1965, 35-41

TOPIC TAGS: powder metallurgy, sintered metal, nickel, oxidation resistance

ABSTRACT: Air or water at high temperature and pressure contains enough free oxygen to form scale on nickel materials. Suitable additives which can be used to prevent oxidation and which also satisfy other requirements are carbon, zinc oxide, and talc. The average product contains 92% nickel and 8% additive and is made at a temperature of 1000C or higher. Specimens of such materials of 15-mm diameter and 100-mm length were exposed to temperatures of 500, 600, and 700C for 110 hours, and the weight increase per unit of surface was measured. Details are given on the behavior of four different materials in contact with air and with steam. The weight increase in air amounted to an average of 10 mg per cm<sup>2</sup> after 110 hours. In steam, the weight increase goes up to 1 $\frac{1}{2}$ % but remains almost constant after 1000 hours. However, negative values were obtained for nickel-carbon materials under the same conditions. The relations between time, oxygen content, oxygen distribution, hardness and brittleness, temperature and time of agglomeration are briefly  
Card 1/2

L 51871-65

ACCESSION NR: AP5008271

mentioned. Orig. art. has: 2 tables and 7 figures.

ASSOCIATION: Institut problem materialovedeniya AN UkrSSR (Institute for Material Science, AN UkrSSR)

SUBMITTED: 04Apr64

ENCL: 00

SUB CODE: MM

NO REF SOV: 003

OTHER: 002

Card <sup>1/2</sup> 2/2

L 4:728-65 EWG(j)/EWP(e)/EPA(s)-2/EWT(m)/EPF(o)/EWP(i)/EPF(n)-2/EWA(d)/  
EPR/EPA(w)-2/T/EWP(t)/EWP(z)/EWP(b) Pr-4/Ps-4/Pt-7/Pu-4/Pab-10/Pad  
IJP(c) WB/WW/JD/HW/JG/WB

ACCESSION NR: AP5010406

UR/0226/65/000/004/0057/0060

68  
67  
B

AUTHOR: Yadorchenko, I. M.; Denisenko, E. T.; Miroshnikov, V. N.

TITLE: Changes in the mechanical properties of packing materials in the process of their oxidation. (Report No. 2)

SOURCE: Foroshkovaya metallurgiya, no. 4, 1965, 57-60

TOPIC TAGS: turbine shroud, Brinell hardness, nickel-graphite packing, shroud liner, graphite burnout, bulk oxidation, surface oxidation, bending strength, cermet bushings, packing material

ABSTRACT: The determination of the service life of steam-turbine packings requires knowledge of their mechanical and physical properties in the original condition and following longtime performance at high temperatures in the air and steam. The authors investigated the Brinell hardness, bending strength and fittability (notch-ability) of sintered nickel-base cermet bushings as a function of temperature and oxidation time. The specimens investigated were first exposed to oxidation for up to 100 hr in air at 550°C and for up to 2000 hr in steam at 550°C. The following compositions were tested: nickel-graphite, nickel-zinc oxide, nickel-talc. It is shown that the wear of turbine-shroud liners can be reduced to a minimum by using

Card 1/2

L 44728-65

ACCESSION NR: AP5010406

a packing material of a hardness of roughly not more than 60 H<sub>g</sub> units. Of the compositions investigated, the nickel-graphite composition satisfies best this requirement. Oxidation greatly affects the hardness and strength of the materials. The increase in hardness on oxidation is a direct function of the degree of oxidation of the material, and of the nature of the material. In the packing materials containing no graphite hardness increases far beyond the permissible limits, whereas in the packing materials containing graphite the increase in hardness is checked by the burnout of the graphite. The nature of oxidation also is a factor: at 550°C in a steam medium, bulk oxidation leads to an increase in strength, whereas surface oxidation leads to a decrease in strength. Orig. art. has: 5 figures, 1 table.

ASSOCIATION: Institut problem materialovedeniya AN UkrSSR (Institute of Problems in the Study of Materials, AN UkrSSR)

SUBMITTED: 05Apr64

ENCL: 00

SUB CODE: MM

NO REF SOV: 002

( OTHER: 000

Card 2/2 TMB

ACC NR: AP6017099

SOURCE CODE: UR/0226/66/000/001/0023/0028

AUTHOR: Miroshnikov, V. N.

ORG: Institute for Problems of Materials Behavior, AN UkrSSR (Institute problem materialovedeniya AN UkrSSR)

TITLE: Development of sealing materials for steam turbines

SOURCE: Poroshkovaya metallurgiya, no. 1, 1966, 23-28

TOPIC TAGS: iron, nickel, copper, graphite, steam turbine, high temperature oxidation, oxidation kinetics, *sealing material*

ABSTRACT: A short literature survey on the thermooxidative stability of iron, copper, nickel, and nickel graphite is presented. The purpose of the survey was to establish criteria for the correct choice of sealing materials used in steam turbines. As a first approximation, the method of C. Wagner and K. Grunewald (Z. Phys. Chem., B. 40, 455, 1938) for determining the oxidation rate constant may be used as a suitable criterion for the determination of the thermooxidative stability of metals in corrosive media at elevated temperatures. It was found that in terms of this criterion the stability of Cu towards oxidation is 4--5 orders of magnitude higher than that of Fe. The calculated oxidation rate constants were compared with experimental data of V. I. Tikhomirov, V. V. Ignat'yev, and I. A. Gofman (DAN, SSSR, KhSU, 2, 305-308, 1954), and fair agreement between calculated and experimental

Card 1/2

L 40041-66

ACC NR: AP6017099

values was found. The influence of additives on the intercrystalline corrosion was also investigated. Nickel is more susceptible to this type of corrosion than either copper or iron. Orig. art. has: 11 equations.

SUB CODE: 11/3/SUBM DATE: 22Jun65/ ORIG REF: 016/ OTH REF: 016

Card

2/2 *gd*



ACC NR AP6007285

sample height. About 14 graphite was added to each of the bronze and the resulting material was analyzed. The compressive strength, porosity and the distribution of pores as functions of compaction force, with a little change in the temperature, were studied. The microstructure showed the graphite and second-phase distribution. The porosity distribution as a function of distance from the surface varied from 14% to 14.5 dK/mm<sup>2</sup>; however, no functional relationship was apparent. Thus, it was established that powder metallurgy methods may be used to produce low-porosity bronzes and bronze-graphite materials with homogeneous and stable structures. Orig. art. has: 5 figures, 6 tables.

SUB CODE: 11/

SUBM DATE: 21Jun65/

ORIG REF: 001

Card 2/2 af



L 34395-66 E.P.(m)/SWP(1)ETI IJF(c) JD/WB

ACC NR: AP6003323 (N) SOURCE CODE: UR/0365/66/002/001/0075/0079

AUTHOR: Miroshnikov, V. N.; Fedorchenko, I. M.

ORG: Institute for Problems of Material Science, AN UkrSSR (Institut problem materia-lovedeniya AN UkrSSR)

TITLE: Oxidation of some bronzes and ferrosilicon in steam

SOURCE: Mashchita metallov, v. 2, no. 1, 1966, 75-79

TOPIC TERMS: metal oxidation, oxidation kinetics, steam turbine, bronze, silicon compound

ABSTRACT. Turbine parts designed to work in steam at high temperatures should possess good corrosion resistance, high mechanical strength, and sufficiently long working life (20,000 - 30,000 hours). Pure copper<sup>1</sup> practically does not oxidize in steam, but its mechanical strength is too low for turbine parts. An investigation was made of a number of bronzes, containing no tin, and of FeSi by observing the kinetics of oxidation from the increase in weight of the samples subjected to the action of steam for up to 100 hr at 560C. Samples of the bronze AZhMts10-3-1.5<sup>1</sup> and FeSi had a high initial oxidation rate, which decreased to a very small rate after 12-14 hr. The large increase in weight suggested that neither should be used for work in high-temperature steam. The samples of the bronzes AZhN10-4-4, AMts9-2, and B2, as well as copper, had

Card 2/2

UDC: 620.193.52

L 34395-66

ACC NR: AP6003323

a low oxidation. The increase in weight of copper was only 0.035 mg/cm<sup>2</sup>. The curves depicting the increase in weight at 560C as a function of time (21 and 100 hr) showed that the resistance to oxidation in the alloys investigated decreased in the following sequence: bronzes AMts9-2, B2, EMts3-1, AZh9-4, and alloy FeSi. The maximum increase in weight of the bronzes AMts9-2 and B2 was 0.13 and 0.21 mg/cm<sup>2</sup>, respectively. A stable, strong, and dense oxidation film was formed on these bronzes. It was concluded that bronzes AMts9-2, B2, EMts3-1, and AZh9-4 have the highest resistance to oxidation among all the materials investigated. The FeSi and bronze AZhMts10-3-1.5 have oxidation rates one order higher and are considered inapplicable for work in steam at elevated temperatures. Orig. art. has: 4 fig., 3 formulas, and 4 tables.

SUB CODE: 11,10 / SUBM DATE: 10May65 / OTH REF: 006 / ORIG REF: 006/

Card 2/2 BL

ACC NR: AP7004397 (✓) SOURCE CODE: UR/0226/67/000/001/0044/0046

AUTHOR: Miroshnikov, V. N.; Yashchenko, Ya. V.

ORG: Institute for Problems in Science of Materials, AN UkrSSR, (Institut problem materialovedeniya, AN UkrSSR); Kiev Polytechnic Institute (Kiyevskiy politekhnicheskii institut)

TITLE: Set up for studying the oxidation of packing materials in water vapor with superhigh parameters

SOURCE: Poroshkovaya metallurgiya, no. 1, 1967, 44-46

TOPIC TAGS: high pressure research, oxidation, high temperature oxidation, parameter, packing material, water vapor, vapor pressure

ABSTRACT: A set-up for measuring oxidation processes in materials used in water-vapor medium at superhigh parameters is described. The set-up is applicable at vapor pressures of up to 140 atm and temperatures up to 570C. It is part of boiler plant PK-31, also described in this paper. Orig. art. has: 2 figures. [Based on authors' abstract]

[AM]

SUB CODE: 11, 13/SUBM DATE: 02Aug66/ORIG REF: 002/  
Card 1/1

MIROSHNIKOV, V.N., kand.sel'skokhozyaystvennykh nauk

Length of the light stage in certain Siberian millet varieties.  
Agrobiologia no. 3:443-446 My-Je '60. (MIRA 13:12)

1. Orenburgskiy sel'skokhozyaystvennyy institut.  
(Millet) (Photoperiodism)

MIROSHNIKOV, V. S.

MIROSHNIKOV, V. S.: "Pine-birch plants in the Belorussian SSR, their structure, and their forestry and economic significance". Minsk, 1955. Min Higher Education USSR. Belorussian Forestry Engineering Institute imeni S. M. Kirov. (Dissertation for the Degree of Candidate of AGRICULTURAL Sciences)

SO: Knizhnyya Letopis' No. 51, 10 December 1955

Country : USSR  
Category : Forestry. Biology and Typology of the Forest. K

Abs Jour : RZhBiol., No 6, 1959, No 24701

Author : Mirosnikov, V. S.  
Inst : Belorussian Forest-Engineering Institute.  
Title : Mixed Birch-Pine Forests in BSSR.

Orig Pub : Sb. nauchn. tr. Belorussk. lesotekhn. in-t,  
1957, vyp. 10, 158-166

Abstract : In places of all sorts of growing conditions, the birch in the first period of joint growth exceeds the pine in height, but as the birch gets older it yields to the pine. The better the places of growing conditions, the earlier does the pine catch up with the birch in height. In forests, older than 50 years, the proportion of the mixture makes no apparent effect on the

Card : 1/3

Country : USSR  
Category : Forestry. Biology and Typology of the Forest. K

Abs Jour : RZhBiol., No 6, 1959, No 24701

Author :  
Inst :  
Title :

Orig Pub :

Abstract : average diameter and the average height of the pine. According to the author's data, the whipping of the pine by the birch has no wide application and causes no particular harm to the forest economy. A negative effect of the birch on the growth of the pine, which is evidenced in inhibiting and whipping of the latter, is observed in the initial period of

Card : 2/3

12

Country : USSR  
Category : Forestry. Biology and Typology of the Forest. K  
Abs Jour : RZhBiol., No 6, 1959, No 24701  
Author :  
Inst :  
Title :  
Orig Pub :  
Abstract : the joint growth. A positive role played by the birch in improving the chemical composition and structure, regime of the humidity, conversion of its coarse coniferous litter into mulch is observed during the entire lifetime of the mixed forests. The pine's optimal growth is noted in forests, in the composition of which the birch consists of 20-30 percent.  
-- I. A. Bashkirov  
Card : 3/3



ZAKHAROV, V.K., prof.; TEULL', O.A., kand.sel'skokhoz.nauk; MIROSHNIKOV,  
V.S., kand.sel'skokhoz.nauk; YERMAKOV, V.Ye., kand.sel'skokhoz.  
nauk; CHERNYAK, I., red.; STEPANOVA, M., tekhn.red.

[Timber valuation manual] Lesotaksatsionnyi spravochnik. Pod  
obshchei red. V.K.Zakharova. Minak. Gos.isd-vo BSSR, 1959.  
300 p. (MIRA 13:4)

(Forests and forestry--Valuation)

MIROSHNIKOV, Vladimir Semenovich; ZAKHAROV, V.K., prof., red.;  
SHERDYUKOVA, S.I., red.; BELEN'KAYA, I.Ye., tekhred.

[Methods of field work in forest valuation] Metodika  
provedeniia uchebnoi praktiki po taksatsii lesa. Pod red.  
V.K.Zakharova. Minsk, Izd-vo Belgosuniv. im. V.I.Lenina,  
1960. 40 p. (MIRA 14:4)  
(Forests and forestry--Valuation)

ZAKHAROV, Vasilii Kirillovich, prof.; TRULL', Oleg Antonovich; MIROSHNIKOV,  
Vladimir Semenovich; YERMAKOV, Viktor Yevseyevich; CHERNYAK, I.,  
red.; NOVIKOVA, V., tekhn. red.

[Forest valuation handbook] Lesotaksatsionnyi spravochnik. Pod  
obshchei red. V.K.Zakharova. Izd.2., ispr.1 dop. Minsk, Gos.  
izd-vo BSSR. Red. nauchno-tekhn.lit-ry, 1962. 367 p.  
(MIRA 15.6)

(Forests and forestry—Valuation)

MIROSHNIKOV, V.

Results of the utilization of hidden potentialities. Avt.  
transp. 41 no.9:13 S '63. (MIRA 16:10)

SAMOYLOVICH, Georgiy Georgiyevich, prof. Irininaia usastiye:  
YEMELEEV, V.S.; KUDITSKIY, D.I.; ZENIN, I.I.; ZAKH, M.K.;  
CHELIKOV, V.I.; GERTSEVA, K.I.; LAPES, I.I.; ZAKHAROV,  
P.M.; DEYNEKO, V.F., doktor tekhn. nauk, prof., retsenzent;  
ZAKHAROV, V.K., prof., retsenzent; MIKOSHNIKOV, V.S., dots.,  
retsenzent; BILCOV, S.V., doktor sel'khoz. nauk, red.

[Use of aerial photographic surveying and airplanes in  
forestry; aerial photography of forests and forest aviation]  
Primenenie aerofotos"emki i aviatsii v lesnom khoziaistve;  
aerofotos"emka lesov i lesnaya aviatsiia. 22d., 20p.  
ispr. Moskva, Lesnaya promyshl., 1964. 48p.

1. Kafedra lesnoy i ksaatli i lesous boystva Belorusskogo  
tekhnologicheskogo instituta (for Zakharov, Mikoshnik v.).

MIROSHNIKOV, Ye.A.

Effect of fat content on heat resisting properties of leather.  
Leg. prom. 18 no.2:13-14 P '58. (MIRA 11:2)

(Leather)

MIRUSHNIKOV, Ya. A.

Effect of moisture content in footwear materials on their heat-insulation properties. Leg. prom. 18 no.3:30-32 Mr '58. (MIRA 11:4)  
(Shoe manufacture)

MIROSHNIKOV, Ye. A., Cand of Tech Sci -- (diss) "Heat protective properties of Materials  
for Shoes ~~and~~," Khar'kov, 1959, 20 pp Moscow Institute of National Economy im S. V.  
Plekhanov) (KL, 5-60, 126)

MIROSHNIKOV, Ye.A.

Heat conducting properties of kersey. Kozh.-obuv.prom.  
no.12:23-25 D 59. (MIRA 13:5)  
(Leather substitutes) (Wool--Thermal properties)

MIROSHCHIK, Ye.A.

Heat insulating properties of artificial fibrous materials for  
shoes. Kozh.-obuv.prom. 3 no.10:11-13 Je '61. (MIRA 14:8  
(Leather, artificial)

MIROSHNIKOV, Yo.A.

Heat insulating properties of shoe material combinations.  
Kozh.-obuv.prom. 4 no.9:18-20 S '62. (MIRA 15:9)  
(Boots and shoes--Thermal properties)

3-7-5/29

M. G. Golikov, Ye.P. Candidate of Historical Sciences, Dotsent.  
to Teach and Educate (uchit' i vospityvat'), Following the  
Examples of Heroic Acts (Na primerakh geroicheskikh del)

Vestnik Vysshey Shkoly, 1957, # 7, pp 21 - 24 (USSR)

The author reports on the work of the Chair of History of the KPSS at the Military Pedagogical Institute, which is based on the idea that the task set by the Party - to improve the training of specialists - must mainly be solved by improving the ideological and theoretical level of education. For this work the material supplied by the XX Congress of the KPSS was of great help, since the teachers were able to eliminate mistakes in the history of the Party. This was reflected in the lectures by Ye.F. Nikitin, Ye.F. Yerykalov, and B.P. Kondrat'yev. Yu.I. Kravlev, D.I. Yesin, I.V. Spiridonov employed for their lectures historical material of Communist meetings and minutes of Communist organizations.

The author emphasizes the importance of scientific research work and states that the Chair members published more than 30 works on the "Military Policy of the Communist Party". As a

... to Educate Following the Examples of Heroic Acts. 5-7-5/29

... result, the teachers have new material which they utilize in their lectures.

... The Higher Military Pedagogical Institute (imeni M.I. Kalinin Vysshiy voyenno-pedagogicheskiy institut imeni M.I. Kalinina)

... Library of Congress

MIROSHNIKOVA, A. P., NASLEDYSHEVA, S. I., and ERU, F. I.

"The Variability of *B. typhi abdominalis* in soil."  
Zhur. Mikrobiol. Epidemiol. Immunitatsoresh. USSR 1939, No. 5, 20-3.

The cultivation of 3 strains of *B. typhi abdominalis* for 3.5 months in unsterile soil resulted in the production of strains resembling *B. faecalis alcaligen*, strains resembling *B. coli*, strains of the *B. paracoli* type which fermented various sugars with acid and gas formation, and strains fermenting sugars with acid formation only. The changed strains could not be returned to the original type.

LEONOV, V.A.; TROTSKIY, V.V.; ...

...  
AN ESS. 5 no. 2. 9-20 ...

1. Sektor perentologii AN S.S. (Faculty— ...)

MIROSENIKOVA, K.I.

Clinical aspects of pyloric stenosis and spasm. *Pediatrics* 39  
no.5:13-17 S-0 '56. (MLRA 10:1)

1. Iz Detskoy gorodskoy klinicheskoy bol'nitsy No.1 (glavnyy vrach -  
zasluzhennyy vrach RSPSR Ye. V.Prokhorovich) i kliniki (dir. - prof.  
N.I.Osinovskiy) II Moskovskogo meditsinskogo instituta imeni  
I.V.Stalina.

(PYLOROSPASM, in infant and child,  
(Rus))

(PYLORUS, stenosis,  
in inf. & child. (Rus))

S/137/63/000/001/014/019  
ACC6/AIG:

AUTHORS: Pyatakova, L. L., Iskhakov, S. S., Shitov, A. P., Miroshnikova,  
K. Ye.

TITLE: On the mechanism of the effect of some elements upon the properties  
of carburized steel

PERIODICAL: Referativnyy zhurnal, Metallurgiya, no. 1, 1963, 50, abstract 11283  
(In collection: "Novoye v metalloved. i tekhnol. term. obrabotki  
stali", Chelyabinsk, 1962, 7 - 23)

TEXT: The authors investigated the Si-Mn steel system containing in %:  
C 0.15 - 0.24, Si 0.80 - 1.30, Mn 1.5 - 2.00 with admixtures of V, Cu, W, B, Ti,  
Cr and Mo. The steel is intended for the production of gears. The effect of  
alloying elements upon martensite transformation was studied.  $M_s$  is most strong-  
ly reduced by Mn and Cr; less by Ni, V, Mo, and is almost not reduced by Si  
and Cu. Due to alloying with Si (1.0 - 1.3%) it is possible to prevent, during  
carburizing, oversaturation of the surface C layer and to obtain a necessary  
depth of the carburized layer at an optimum C content (0.85 - 0.9%). Si-Mn

Card 1/2

On the mechanism of the effect of...

S/137/63/000/001/014/019  
AG06/A101

steels have a martensite transformation temperature as high as 300 to 365°C. Admixtures of Mo, V, Cr (0.5 - 0.7%) or B (0.001 - 0.002%) to Si-Mn steel secure high roasting ability and satisfactory properties on large-size parts, up to 100 mm in diameter. Si-Mn steels have  $\sigma_b$  132 - 167 kg/mm<sup>2</sup>,  $\sigma_s$  122 - 145 kg/mm<sup>2</sup>,  $\delta$  10 - 15%,  $\psi$  53.5 - 66.6%,  $a_k$  10.3 - 13.8 kkm/cm<sup>2</sup>; grain size is 2.9 - 3.2. Additional alloying of the steel with V, Cu and Mo prevents grain growth, strengthens the grain boundaries and increases roasting ability. Alloying affects the failure resistance of the steel due to its increased ductility (in martensite state). Grade 17CF 2 M (17SG2M) steel, developed on the basis of the investigations, offers high fatigue contact and operational strength. The use of this steel instead of 12X2H4 (12Kh2NCh) steel yields savings of about 70 rubles per 1 ton. There are 12 references.

L. Koblikova

[Abstracter's note: Complete translation]

Card 2/2

(N) L 12086-66 EWP(e)/EWT(m)/EWP(w)/ETC(F)/EWG(m)/EWA(d)/T/EWP(t)/EWP(z)/EWP(b)  
 ACC NR: AP6000601 IJP(c) MJW/JD/HW/JG/WB/AT/WH UR/0129/65/000/012/0002/0005 6.2  
 AUTHOR: Gulyayev, A. P.; Miroshnikova, K. Ye. 5.1  
 ORG: Moscow Institute of Chemical Machine Building (Moskovskiy institut khimicheskogo mashinostroyeniya) 49.55  
 TITLE: Intercrystalline corrosion of certain austenitic stainless steels 44.55 16  
 SOURCE: Metallovedeniye i termicheskaya obrabotka metallov, no. 12, 1965, 2-5, and top half of insert facing p. 40, and both sides of insert between p. 24 and 25  
 TOPIC TAGS: intercrystalline corrosion, corrosion test, stainless steel, austenite, carbide  
 ABSTRACT: At 400-300°C processes causing proneness to intercrystalline corrosion occur in austenitic stainless steels. Bain (Chemistry and Industry, 1932, v. 51) attributes this to the depletion of Cr along grain boundaries, while Stickler and Vinckler (Mem. scient. rev. metallurgie, 1963, v. 60, no.7-8) believe that this is caused by the special alignment of carbides along grain boundaries and the difference in the potentials of the carbide-austenite micro-pair. Accordingly, these processes were investigated at the specified temperatures for four types of austenitic stainless steels: X1943, EP212, X1711 and X1810T. Specimens of these steels (90x20x4 mm) were water-quenched from 1050-1100°C and tempered at 500, 550, 600, 650, 700, 750 and 850°C for

Card 1/2 UDC: 669.14.018.240.620.125 7

L 12086-66

ACC NR: AP6000601

5

from 10 min to 1000 hr and subjected to corrosion tests. The Cr content at grain boundaries was determined by means of local X-ray spectral analysis. Findings: intensive intercrystalline corrosion develops in EI943, KP212 and EI711 steels at 700°C and in Kh18N10T steel at 600°C. Prowess to intercrystalline corrosion is caused by the segregation of carbide networks along grain boundaries. The difference in electrochemical potentials between the network of carbides and austenite constitutes the motive power of intercrystalline fracture. The volume of metal surrounding a carbide inclusion is subject to corrosion fracture. If the carbides are spaced sufficiently far apart, these volumes will not be in mutual contact and hence there will be no continuous penetration of the corrosion medium into the metal interior along the grain boundaries: in such cases the steel is not prone to intercrystalline corrosion. In cases of a more aggressive medium, on the other hand, a larger volume of metal around carbide inclusions is subject to corrosion. These volumes contact, and this is accompanied by a continuous penetration of the corrosion medium into the metal interior along the grain boundaries: in such cases the steel is prone to intercrystalline corrosion. Further, no depletion of Cr from the boundaries of austenite grains has been found in steel prone to intercrystalline corrosion. Orig. art. has: 1 table, 6 [4] figures.

SUB CODE: 11, 13/ SUBM DATE: none/ ORIG REF: 003/ JTH REV: 002

Card

2/2

TSAY, T.N., inzh.; YEROFEYEV, L.M., inzh.; MIROSHNIKOVA, L.A., inzh.

Studying the stability of untimbered mine workings in a biaxial stressed state using the photoelastic method. Trudy Kuznitskikh-tostroia no.1:63-79 '63.  
(MIRA 1968)

ACC NR: AT7002122

(A)

SOURCE CODE: UR/0000/66/000/000/0445/0453

AUTHORS: Yerofeyev, L. M.; Miroshnikova, L. A.

ORG: none

TITLE: Study of rock-pressure phenomena in the tunnel support-rock system

SOURCE: Vsesoyuznaya konferentsiya po polyarizatsionno-opticheskomu metodu issledovaniya napryazheniy. 5th, Leningrad, 1964. Polyarizatsionno-opticheskiy metod issledovaniya napryazheniy (Polarizing-optical method of investigating stresses); trudy konferentsii. Leningrad, Izd-vo Leningr. univ., 1966, 445-455

TOPIC TAGS: mining engineering, pressure effect, stress analysis

ABSTRACT: The general shortcoming of existing theories on rock pressures in mine workings involving rocks and tunnel supports is their failure to consider the parameters of the supports and the form of the mine working. The purpose of the present work is to study rock pressure in this system of tunnel support and rock for a single horizontal working with due consideration to these parameters. A plate was placed on a layer of sand (26 cm thick) and was then used as a base for two frames of the simulated tunnel support. One frame was made of optically active material, the other of slightly active plastic. Special plates were placed on the frames, bounding the tunnel or "working" and keeping out the sand used in loading. Stresses on the elements of the support were also determined by means of these plates. Experiments were carried out

Card 1/2

UDC: none

ACC NR: AT7002122

for different stresses and for differently shaped workings. Stresses in the elements of the supports for all models were determined by the photoelastic method. Results show that the bending moment on a support of an arched opening is but  $1/8$  that of a rectangular opening. This factor is of great importance in designing reinforced-concrete supports for mine workings. Computations of yield point by means of the simple models used proved to agree very well with measurements obtained in actual mine workings. Orig. art. has: 6 figures and 2 tables.

SUB CODE: 08/ SUBM DATE: 14Jun66/ ORIG REF: 011/ ATD PRESS: 5113

Card 2/2

MIROSHNIKOVA, L. M.

MIROSHNIKOVA, L. M. -- "Local Darkness Adaption in Diseases of the Optic-Nerve Apparatus." Khar'kov Medical Inst. Khar'kov, 1956. (Dissertation for the Degree of Candidate of Medical Sciences.)

SO: Knizhnyaya letopis', No. 4, Moscow, 1956.

*M. S. H. K. O. V. A. L. M.*

1950. Local dark adaptation in hemiplegia. L. M. Miroshnikova. *Otol. Zh.*, 1953, No. 3, 146-147; *Referral. Zh.*, 1953, 1953, Abstr. No. 81367. — Investigations were carried out by an adaptometer superimposed on to the perimeter principle. In the normal, adaptation is equally strong in symmetrical parts of the nasal and temporal halves of the retina, the sensitivity increasing from centre to periphery. In general symmetrical compression of the chiasms a lowering of local dark adaptation is observed in the nasal and temporal halves of the retina. In partial compression of the chiasms the interference with dark adaptation corresponded to the side of the more damaged eye. In bilateral affection of the central neurons there is observed a varying degree of lowering of adaptation. In cases of organic disease the disturbance of local dark adaptation there is a sharp lowering in the parts affected, and an appreciable rise in the preserved parts of the analyzer. The value of the investigation of local dark adaptation for the topical and early diagnosis of affection of the path of the optic nerve is emphasized. (Russian)

T. R. PAXSON

MIROSHNIKOVA, L.M., assistant, BEZBOROD'KO, S.V., vrach

Riboflavin and its use in treating eye diseases. Oft. zhur. 13  
no. 3:140-142 '58 (MIRA 11:6)

1. Iz kafedry glaznykh bolezney (zav. - chlen-korrespondent  
AMN SSSR prof. I.I. Markulov) i Ukrainskogo nauchno-issledovatel'skogo  
instituta glaznykh bolezney im. prof. Girshmana (direktor - chlen-  
korrespondent AMN SSSR prof. I.I. Markulov).  
(CORNEA--DISEASES)  
(RIBOFLAVIN)

MIROSHNIKOVA, L.M., kand.med.nauk

Local dark adaptation in detachment of the retina. Opt. zhur. 16  
no.3:170-174 '61. (MIRA 14:5)

1. Ukrainskogo nauchno-issledovatel'skogo instituta glaznykh  
bolezney imeni prof. L.L.Girshmana (direktor - zasluzhennyy deyatel'  
nauki, chlen-korrespondent AMN SSSR prof. I.I.Merkulov) i Ukrainskogo  
instituta usovershenstvovaniya vrachey.  
(EYE—ACCOMODATION AND REFRACTION)  
(RETINA—DISEASES)

СЛУЖБА БЕЗОПАСНОСТІ РАДІ  
СІПАРСМ, 1986

Інформація надійшла з  
№ 7 1986 р.

1. Незабаром почнуться  
(дир. - канд. мед. наук М.В. Шевченко

MIROSHNIKOVA, T.P., kandidat tekhnicheskikh nauk.

Research on the hulling of castor beans. Sel'khoz mashina no.2:  
21-24 P '54. (MLRA 7:2)

(Castor bean--Harvesting)

DOMBROVSKIY, M.I., dotsent; MIROSHNIKOVA, T.F., kandidat tekhnicheskikh  
nauk

Research on the working parts of machines for husking corn.

Sel'khoz mashina no. 10:13-16 0'55.

(Corn picker (Machine))

(MLRA 8:12)

MIROSHNIKOVA, T.F.

Utilizing the force of impact in the process of threshing castor  
plants. Sel'khoz mashina no.2:20-22 F '56. (MLRA 9:5)  
(Threshing machines)

MIROSHNIKOVA, Ye. Z.

"Angiosarcoma of the Tonsil in a Child,  
Similar in Appearance to Peritonsillar  
Abscess", Vest. Oto-rino-laringol., No 4, 1947,  
Clinic, Khabarovsk, Med. Inst., -1948-.

*1. Izhivskiy, Ye. Z.*  
GLUBOKOVA, P.D.; MIROSHNIKOVA, Ye.Z.; KUTENOV, V.P.

Condition of the upper respiratory tracts and ear in agricultural workers of Lenin and Vyazemskiy Districts, Khabarovsk Territory. Vest. oto-rin. 17 no.5:66-69 S-0 '55. (MIRA 9:2)

1. Iz kafedry bolezney ukha, gorla, i nosa (zav. prof. P.A. Shvarts) Khabarovskogo meditsinskogo instituta.

(OTORHINOLARYNGOLOGY,  
otorhinolaryngol. organs in agricultural workers)

(AGRICULTURE,  
otorhinolaryngol. organs in agricultural workers)

SHVARTS, B.A.; GLUBOKOVA, P.D.; MIROSHNIKOVA, Ye.Z.; BIRYUZOVA, A.M.

Penicillin therapy in otorhinolaryngology. Vest.oto-rin. 19  
no.6:22 n-D '57 (MIRA 11:3)

1. Iz kliniki bolezney ukha, gorla i nosa (zav.-prof. B.A. Shverts)  
Khabarovskogo meditsinskogo instituta.  
(PENICILLIN) (OTORHINOLARYNGOLOGY)

MIROSHNIKOVA, Ye.Z., kand.med.nauk

Papillomatosis of the larynx as a precancerous condition [with summary in English]. Vest.oto-rin. 20 no.4:74-78 J1-Ag'58 (MIRA 11:7)

1. Iz kafedry bolezney ucha, gorla i nosa (zav. - doktor med.nauk V.S. Lyande) Khabarovskogo meditsinskogo instituta.

(LARYNX, neoplasms

papillomatosis as precancerous cond. (Rus))

(PAPILLOMA,

laryngeal papillomatosis as precancer (Rus))

LYANDE, V.S.; GLUBOKOVA, P.D.; MIROSHNIKOVA, Ye.Z.; GERASIMOVA, S.S.;  
USOL'TSEV, V.N.

State of the upper respiratory tract and the organ of hearing in  
singers and voice students in Khabarovsk. Trudy Khab.med.inst.  
no.20:147-155 '60. (MIRA 14:1)

1. Iz kliniki bolezney ukha, goral i nosa (zav. prof. V.S.Lyande)  
Khabarovskogo meditsinskogo instituta.  
(Khabarovsk--SINGERS--DISEASES AND HYGIENE) (RESPIRATORY ORGANS)  
(EAR)

GLUBOKOVA, P.D.; MIROSHNIKOVA, Ye.Z.

State of the upper respiratory tract and ear in various population groups of the Far East. Trudy Khab.med.inst. no.20:177-182 '60.

(MIRA 17:10)

1. Iz kliniki bolezney ukha, gorla i nosa (zav. prof. V.S.Lyunde) Khabarovskogo meditsinskogo instituta.

(SOVIET FAR EAST--RESPIRATORY ORGANS) (SOVIET FAR EAST--EAR)

MIROSHNIKOVA, Ye.Z., kand.med.nauk

Otogenous sepsis as revealed by materials from an otolaryngological clinic for a decade. Zhur. ush., nos. i gorl. bol. 20 no.1:80 Ja-F '60.  
(MIRA 14:5)

1. Iz otolaringologicheskoy kliniki (zav. - prof. V.S.Lyande)  
Khabarovskogo meditsinskogo instituta.  
(EAR---DISEASES)

MIROSHNIKOVA, Ye. Z. (Khabarovsk, Komsomol'skaya, 85a, kv. 38)

Mitotic activity in laryngeal papillomas in adults and children.  
Vop. onk. 8 no. 5: 38-42 '62. (MIRA 15.7)

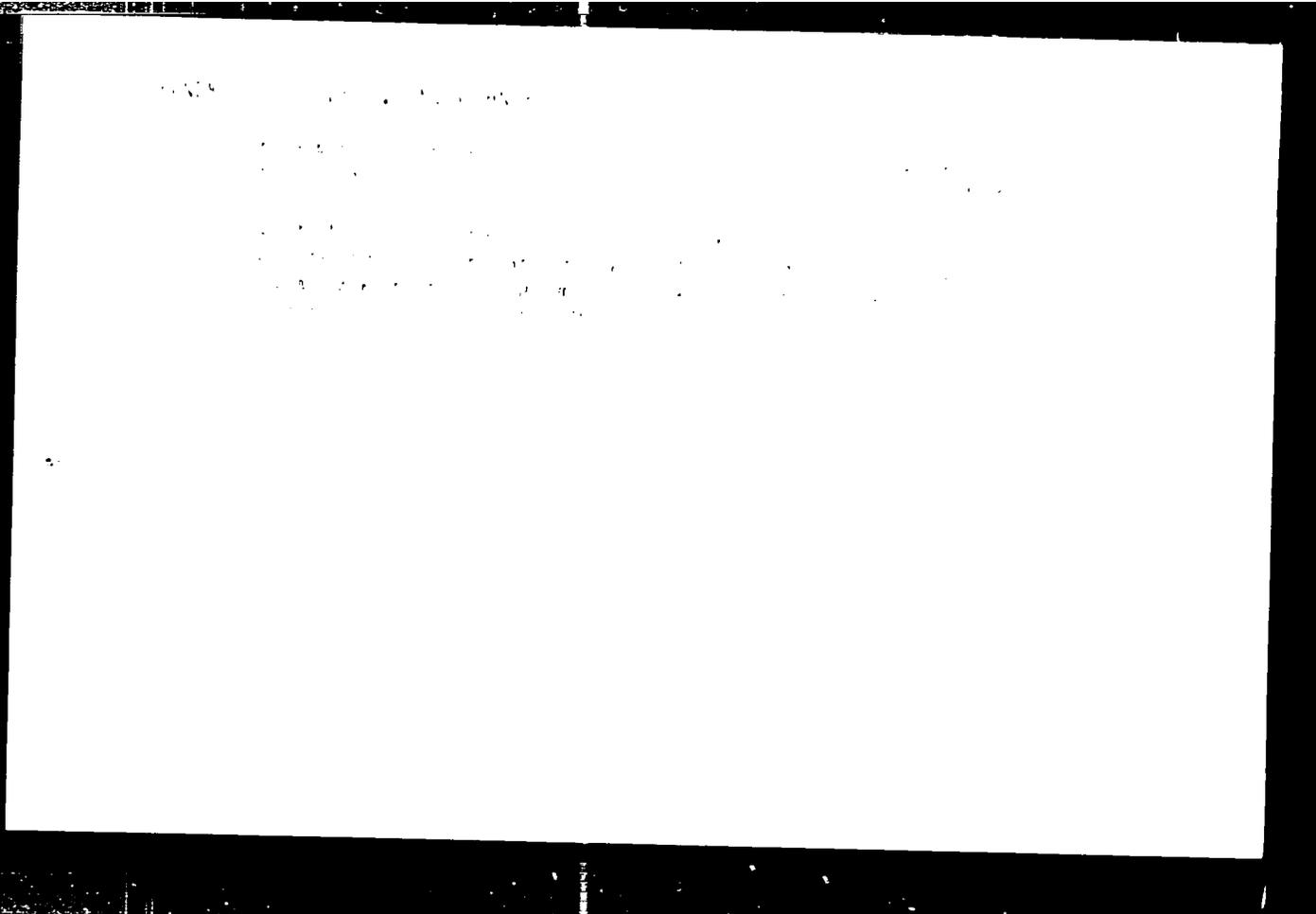
1. Iz kliniki bolezney ukha, gorla, nosa (zav. - prof. V. S. Lyande) i kafedry gistologii (zav. - prof. I. A. Alov) Khabarovskogo meditsinskogo instituta.

(LARYNX - TUMORS) (CELL DIVISION(BIOLOGY))

MIROSHNIKOVA, Ye.Z., kand.med.nauk

Cancer of the larynx in a patient with a long history of scleroma of the respiratory tracts. Zhon.ush., nos. 1 gorl.bcl.23  
no.3274 My-Je'63. (MIRA 16:7)

1. Iz kliniki bolezney ukha, gorla i nosa (zav.-prof. V.S.Lyudsk)  
Khabarovskogo meditsinskogo instituta.  
(LARYNX—CANCER) (RHINOSCLEROMA)



SECRET

CONFIDENTIAL

TOP SECRET

~~MIROSHNIKOVA-HEKKANDT~~, M.A.; PERVUSHIN, B.P., professor, nauchnyy rukovoditel';  
KOVAL'SKIY, G.N., dotsent, direktor.

Increasing the virulence of the smallpox vaccine virus by the selection method (Author's abstract). Zhur.mikrobiol.epid.i immun. no.7:77-78 JI '53.  
(MLMA 6:4)

1. Krasnodarskiy institut epidemiologii i mikrobiologii imeni I.G.Savchenko.  
(Viruses) (Smallpox)

POLIACHEK, Yuray; MIROSLAV, Ebr

The rally "For Peace and Friendship " ... rul. 19 no 8:14-15  
Ag '61. (MIR 14:9)

1. Redaktor zhurnala "Svet Motaru" (for Ebr).  
(Automobile racing)

L 31015-66

ACC NR: AP6023123

(A)

SOURCE CODE: CZ/0060/65/000/006/0201/0263

AUTHOR: Bielicky, Tibor (Docent; Doctor of medicine, Doctor of sciences); Bartak, Pavel; Zak, Miroslav; Halina, Lubor

ORG: Dermatological Clinic, Medical Faculty of Hygiene, KU /headed by Docent, Doctor of medicine, Doctor of sciences T. Bielicky/, Prague (Kozni klinika lebarske fakulty hygienicke KU); Institute of Biophysics, Medical Faculty, KU /headed by Docent, Doctor of medicine, Doctor of sciences Z. Dionstbier/, Prague (Biofyzikalni ustav lebarske fakulty KU)

TITLE: Study of the protecting effect of chloroquin administered to guinea pigs suffering from skin diseases caused by x-ray irradiation

SOURCE: <sup>12</sup> Vojenska zdravotnicko listy, no. 6, 1965, 261-263

TOPIC TAGS: experiment animal, drug effect, radiation injury, skin physiology, biosynthesis

ABSTRACT: Chloroquin has a good effect in healing injuries caused by irradiation; with increasing doses the effect increases. Best results were obtained when the drug was administered 2 hours before irradiation. The drug stimulates the activity of the pentose cycle. It maintains the SH groups in a reduced state, reduces folic acid to tetrahydrofolic acid, thereby making possible the synthesis of purines and pyrimidins, and it stimulates the formation of lipids and phospholipids. It is assumed that every factor stimulating pentose activity helps in skin regeneration. Orig. art.

has: 2 figures and 1 table. [JPRS]

SUB CODE: 06 / SUBM DATE: none / ORIG REF: 006 / OTH REF: 009

Card 1/1 LC

UDC: 616.5-001.27-085.778(.547.835.3)-097.9

MIROSLAV, Mann

Contribution to the transplantation to a septic area. Acta chir.  
orthop. trauma. Cech. 28 no.1:25-28 F '61.

1. Chirurgické oddelení nemocnice v Novém Městě na Mor.

(BONE AND BONES transpl)



NUCLEAR POWER

FD-1501

USSR/Physics - Servomechanisms

Card 1/1 : Pub. 129-4,18

Author : Miroslav<sup>1</sup>ev, Ye. N.

Title : Nonlinear systems with correcting devices

Periodical : Vest. Mosk. un., Ser. fizikomat. i yest. nauk, 9, No 6, 33-40, Sep 54

Abstract : A system with automatic control with one nonlinear element and one correcting link of first order is studied. Derives corresponding equations and solves the problem in the case of a simplified system. Seven references, all USSR.

Institution : Chair of Applied Mechanics, Moscow University

Submitted : April 22, 1954

LITVIN-SEDOY, M.Z., <sup>45</sup> ~~kandidat fiziko-matematicheskikh nauk~~; MIROSLAVLEV, Ye.N.,  
kandidat fiziko-matematicheskikh nauk, rezensent; POPOVA, S.N.,  
tekhnicheskii redaktor

[Hydraulic drive in automatic systems] Gidravlicheskii privod v  
sistemakh avtomatiki. Moskva, Gos. nauchno-tekhn. izd-vo mashino-  
stroit.lit-ry, 1956. 311 p. (MIRA 10:2)  
(Automatic control) (Hydraulic machinery)

MIROSLAVLJEV, V. N.

10(2); 26(1); 29(1) PHASE I BOOK EXPLOITATION SOV/603

Source: Vysshye tekhnicheskoye uchilishche imeni Baumanovskogo voproyz mekhaniki; sbornik statey (Some Problems in Mechanics; Collection of Articles) Moscow, Gostekhizdat, 1958, 197 p. (Series: Its [trudy] 77p. 88) Number of copies printed not given.

M. (title page); V.I. Fedosov, Doctor of Technical Sciences, Professor; Ed. (Initials Not Given); A.S. Ginevalsky, Candidate of Technical Sciences; M. of Publishing House; L. Ye. Serbrennaya, Tech. Ed.; E.A. Gurmanina, Managing Ed.; A.S. Zaynovskaya, Engineer.

PURPOSE: This collection is intended for scientific workers, aspirants and students of advanced courses who are interested in problems of aero- and gas dynamics and in the theory of directional control of aircraft.

COVERAGE: The collection contains reports on various problems in applied mechanics. A large portion of the articles are devoted to aerodynamic and gas dynamic investigations. In the first article of the collection, the author, Professor E.P. Stanyukovich, considers the loss of energy of a mechanical jet medium - in particular, the loss of energy of a mechanical mixture of a liquid and a gas with liberation of the motion of a burning fluid jet. The two reports by M.P. Frankov deal with the aerodynamics of bodies of revolution. In the first, he develops briefly the method of characteristics as applied to the calculation of the aerodynamic characteristics of a body of revolution moving at both subsonic and supersonic speeds. He presents an approximate formula derived from the calculation of the base-drag coefficient in the case of turbulent flow about a body at supersonic speeds. G.M. Kirapilina presents in her report the approximate formulae obtained for determining the distance between an isolated compression shock and the vertex of a blunt-nosed body of arbitrary form in supersonic flow, and also for determining the velocity and pressure near the critical point. Professor Pashchkin presents in his report the partial and general solutions of the differential equation used in the investigation

of the flow about bodies of revolution at high subsonic speeds. Kovalev's article is concerned with the banking of an aerodynamic surface in a supersonic gas flow. He proposes a method for calculating an arbitrary damping moment for wings of rectangular, triangular, and trapezoidal forms. Fediger's article is concerned with the damping moment produced by the gas flow from a jet axis of rotation is not parallel to the vertical axis. Pobedonostsev and Stanyukovich investigate in their article the problem of optimum ratios of the stages of a multistage rocket. In another report, Stanyukovich generalizes Talolkovskiy's ratio in the relationship between the damping moment and the damping moment. The last three articles of the collection are devoted to problems of directional control of aircraft and the theory of automatic control. Zhukilov investigates an unsealed control mechanism with gas transmission. Semylov considers another variety of a control mechanism based on the use of a so-called stream tube. In the last report,

Card 800  
7-

307/603

Some Problems in Mechanics (cont.)  
Kamshayev investigates the motion characteristics of one of the automatic control systems used, especially in air-craft and in ship's steering gear.

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AVAILABLE: Library of Congress

Card 2/2

AUTHOR: Miroslavlev, Ye.N. SOV/55-58-1-7/33

TITLE: On a Non-Linear System of Automatic Control With a Correcting Term  
(Ob odnoy nelineynoy sisteme avtomaticheskogo regulirovaniya s  
korrektiruyushchim zvenom)

PERIODICAL: Vestnik Moskovskogo universiteta, Seriya fiziko-matematicheskikh i  
yestestvennykh nauk, 1958, Nr 1, pp 69-72 (USSR)

ABSTRACT: The author considers the system  $(T^2 D^2 + VD) \varphi + K\beta + \eta = 0$ ,  
 $D\varphi - D\beta = S\beta$ ,  $(I^2 D^2 + WD)\eta = F(\xi)$ ,  $(T_2 D + 1)\xi = (T_1 D + 1)\varphi -$   
 $-m(T_2 D + 1)\eta$ ;  $D \equiv \frac{d}{dt}$ ,  $T^2 = \text{const}$ ,  $V = \text{const}$ ,  $S = \text{const}$ . The  
author replaces the nonlinear function  $F(\xi)$  by  $h\xi$  (see [Ref 1])  
and determines the region of stability of the arising linear  
system in the plane  $(T_1, h)$ . Furthermore the influence of  $T$  is  
investigated. With the aid of the system e.g. a control of the  
azimuth of course  $\varphi$  of an airplane or a ship can be described.  
There are 2 Soviet references.

ASSOCIATION: Kafedra prikladnoy matematiki (Chair of Applied Mathematics)  
SUBMITTED: May 16, 1956

Card 1/1

MIROSLAVLEV, Ye.M.

Oscillation period of a balance wheel with distributed impulse.

Nauch.dokl.vys.shkoly; mash.i prib. no.4:238-241 '58.

(MIRA 12:5)

1. Stat'ya predstavlena kafedroy "Matematika" Moskovskogo  
vysshogo tekhnicheskogo uchilishcha im. Baubana.

(Clocks and watches)

MIROSLAVOV, Ye.A.

Diurnal movements of the corolla in *Gentiana olivieri* Griseb.  
Bot. zhur. 43 no.6:857-860 Ja '59. (MIRA 11:7,  
(Plants--Irritability and movements) (Gentiana) (Inflorescence)

MIROSLAVOV, Ye. A. Cand Biol Sci -- (diss) "On ~~the~~ trichomic formations of  
the blossom of the figwort family and their functional importance for ~~the~~ plants."  
Len, 1959. 19 pp (Acad Sci USSR. Botanical Inst im V. L. Komarov), 150 copies  
(KL, 45-59, 145)

MIROSLAVOV, Ye.A.

Peroxidase, ascorbic acid and sugar concentrations in the trichomes  
of certain plants. Bot. zhur. 44 no.4:550-554 Ap '59.

(MIRA 12:10)

1. Botanicheskiy institut im. V.L. Komarova Akademii nauk SSSR,  
Leningrad.

(Trichomes) (Ascorbic acid) (Peroxidase)  
(Sugars)

17(1)

AUTHOR:

Miroslavov, Ye. A.

TITLE:

On the Physiological Role of the Non-head-shaped Trichomas of the Sepal of the Flower of *Melampyrum nemorosum* L. (K voprosu o fiziologicheskoy roli negolovchatykh trikhom hashelistikov tsvetka *Melampyrum nemorosum* L.)

PERIODICAL:

Doklady Akademii nauk SSSR, 1959, Vol 126, No 1, pp 203-206 (USSR)

ABSTRACT:

As is known, the role played by the so-called simple (non-head-shaped) trichomas in the lives of plants, is extremely manifold. They can protect the plant from extreme heat or cold (Ref 1), serve as means for spreading the seeds, protect against animals (Ref 2), etc. All these functions are only fulfilled by the trichomas when their cells are already dead. The role of the living trichomas has hardly been investigated. Several suppositions concerning this problem have been made (Refs 8-10). In 92 kinds of plants the author studied the distribution of living trichomas in earlier stages of the development of organs carrying them. He also studied their development as mentioned in the title, as well as in the cases of *Veronica*

Card 1/4

SOV/20-126-1-56/62

On the Physiological Role of the Non-head-shaped Trichomas of the Sepal of the Flower of *Melampyrum nemorosum* L.

*gentianoides* and *digitalis grandiflora*. The quantity and at the same time also the cytology of the trichomas were studied in the living object. Figure 1 shows a trichoma of *Mel. nemorosum* in the moment of the formation of stomata. The cuticular transpiration was determined according to reference 8. For this purpose the sprout, or the organ under water is cut-off and dipped into an aqueous solution of fluorochromium (in this case berberine sulfate). *Euphrasia tatarica* and *Veronica longifolia* were examined in the same way. Figure 2 shows a picture of the trichomas in which the higher cuticular transpiration can be seen as more fluorescing parts under the fluorescent microscope. In *Veronica scutellata* the capability of holding water was determined in 2 kinds: a) very haired, b) hardly haired. The more intensive transpiration in kind a) (both grow under the same ecological conditions) may be due to more intensive cuticular transpiration of the living trichomas. Consequently following features were found: 1) The sepals experience a considerable development while the mechanisms of the stomata have not reached their function and a mere cuticular transpiration

Card 2/4

SOV/20-126-1-56/62

On the Physiological Role of the Non-head-shaped Trichomas of the Sepal of the Flower of *Melampyrum nemorosum* L.

takes place. 2) The formation of hairs begins during the earliest development stage of the sepals long before the formation of the stomata takes place. 3) Since the trichomas develop very fast, they soon reach a considerable size and thus enlarge the transpiring surface of the organ considerably. 4) Cuticular transpiration of the living trichomas is much higher than that of the epidermis cells. 5) Trichomas usually arrange along nerves. From this the conclusion may be drawn that the role the trichomas play in transpiration is of possible importance, especially in the early phases of the organs carrying them, and for the time the stomata have not reached their function. The trichomas thus carry nourishment into the growing organ. Prof. V. G. Aleksandrov co-operated in this work. There are 2 figures and 11 references, 5 of which are Soviet.

ASSOCIATION:

Botanicheskiy institut im. V. L. Komarova Akademii nauk SSSR  
(Botanical Institute imeni V. L. Komarov of the Academy of Sciences, USSR)

Card 3/4

SOV/20-126-1-56/62

On the Physiological Role of the Non-head-shaped Trichomas of the Sepal of  
the Flower of *Melampyrum nemorosum* L.

PRESENTED: December 26, 1958, by V. N. Sukachev, Academician

SUBMITTED: December 25, 1958

Card 4/4

ALEKSANDROV, V.G.; MIROSLAVOV, Ye.A.

Characteristics of the structure of leaves of some species of willows  
growing in the northwestern part of the U. S. S. R. Bot. zhur.  
47 no.6:852-856 Je '62. (MIRA 15:7)

1. Botanicheskiy institut imeni V.L. Komarova AN S.S.R., Leningrad.  
(Leningrad Province--Willows)  
(Leaves--Anatomy)

MIROSLAVOV, Ye.A.

Some characters of the xeromorphic structure of leaf epidermis in  
certain gramineous plants. Bot. zhur. 47 no.9:1339-1342 S '62.  
(MIRA 16:5)

1. Botanicheskiy institut imeni V.L.Komarova AN SSSR, Leningrad.  
(Grasses) (Leaves--Anatomy)

MIROSLAVOV, Ye.A.

Structural characteristics of the awns of the wheat ear as related  
to the water regime of the plant. Bot. zhur. 48 no.12:1812-1817  
D '63. (MIRA 17:4)

1. Botanicheskiy institut imeni Komarova AN SSSR, Leningrad.

MIROSLAVSKAYA, A.O., inzh.

Determination of the oil content of seeds, husks, and shells.  
Masl.-zhir.prom. 26 no.9:14-15 S '60. (MIRA 13:8)

1. Ferganskiy maslozhirovoy kombinat.  
(Fergana--Oilseeds)

NAAB, A.Yu., inzh.; MIROSLAVSKAYA, G.A., inzh.

Device for rapid drying of fats and fatty acids. Masl. - zhir.  
prom. 27 no.8:33 kg '61. (MIRA 14:8)

1. Ferganskiy maslozhirovoy kombinat.  
(Drying apparatus (Cottonseed oil)  
(Fatty acids)

MAAB, A.Ya., inzh.; MIROSLAVSKAYA, G.A.

Modified method of volumetric determination of nickel and copper  
content. Masl.-zhir.prom. 28 no.3:39-40 Mr '62. (MIRA 15:4)

1. Ferganskiy maslozhirovoy kombinat.  
(Oils and fats--Analysis) (Titration)

5(1)

AUTHORS:

Miroslavskaya, Yu. A., Engineer, Khabarovsk, M. S. G. of Technical Sciences, Gletova, L. I., Engineer

TITLE:

Gasifier of Liquid Oxygen With Vacuum Insulation (Gasifikator zhidkogo kisloroda s vakuumnoy izolatsiyey)

PERIODICAL:

Kislorod, 1988, Nr 1, pp 9 - 10 (1988)

ABSTRACT:

The gasifier mentioned mainly consists of two concentric balloons and a vacuum between them. The inner balloon has a capacity of 20 l. A funnel leads to it, with a tube for the supply of liquid oxygen, which also serves to regulate and discharging the surplus vapor, and a measured feed tube for vaporous oxygen from the receivers for the control of the of overpressure. The inner liquid oxygen feed tube is for the purpose of discharging the oxygen into the vacuum. An absorbing device is fastened to the outer wall of the inner balloon to absorb any oxygen that might leak through the cracks or pores. The whole device and the inner balloon separately were checked by means of a leakage detecting instrument of the PTI-4A type. More leakage was found to come from the inner container, which made the application of the

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07-07-66-1,22

absorber necessary. Investigations were carried out of the effectiveness of several absorbing materials depending on temperature and pressure, and silica gel KSM (GOST 3956-54) proved to be the most suitable. A thermal calculation was carried out of the whole device. The entire heat conductivity of the device, leading to an additional vaporization of the liquid oxygen in the inner balloon, consists of:

$Q_1$  of the heat conductivity of residual gases in the vacuum;

this was calculated according to reference 6 taking into account the device to be  $Q_1 = 0.19$  kcal/hour, from  $Q_1$  and  $Q_2$

the heat conductivity of the metallic parts of the balloon and of the outer parts of the supply funnel.

$Q_2$  was calculated to be 0.77 kcal/hour.

$Q_2'$  for the discharge and supply tube of liquid oxygen was calculated according to Egg's formula (Ref 7);  $Q_2' = 0.34$  kcal/hour;

$Q_3$  the heat radiation from the outer to the inner balloon

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377, 21-10-6-1-1

through the funnel 3.56 kcal/hour.  
 $Q = Q_1 + Q_2 + Q_3 + Q_4$ , averages 4.62 kcal/hour within the temperature range of +20° and -5°.

Practical experience has shown that 30-100 g of li will oxygen vaporize, corresponding to a heat flow of 4.1-5.1 kcal/hour, which is in good agreement with the calculated value of 4.62 kcal/hour. It was found that heat radiation is the main cause of losses. There are 11 figures, 2 tables, and 8 references, 6 of which are Soviet. The gasifier was constructed by NIIMASH and has already been introduced in production.

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AUTHOR: Miroslavskaya, Yu. A., Engineer SOV/67-59-3-26/27

TITLE: Information Material (Spravochnyye materialy) Pumps for Low Temperature Fixed Gases (Nasosy dlya nizkotemperaturnykh ozhizhennykh gazov)

PERIODICAL: Kislorod, 1959, Nr 3, Inside Rear Cover (USSR)

ABSTRACT: The table gives a list of the following data of the pumps NZhK-1,-3,-4,-7,-9,-11,-12,-14,-15 with the registered sign of the VNIKIMASH in the same order SV 2301, SV 2304, ..2305, ..2311, ..2313, ..2316, ..2318, ..2320, ..2321 : pressure (atmospheres excess pressure), output in l/hour, type of the electric motor used, power (kwatt), number of rpm, further, the dimensions of the pump (width and height in millimeter), the weight with the electric motor in kg as well as the type of the pump, the liquid which is pumped, and data concerning the characteristics of the pump.

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MIROSLAVSKAYA, Yu.A., inzh.

NZhK-7 liquid oxygen pump. Trudy VNIIMASH no.4:38-42  
'61. (MIRA 15:1)

(Oxygen)  
(Pumping machinery)

13350

3/100/02/00000002/002  
R202/0402

AUTHORS: V. I. Proslavskiy, Eng. V. V. Ivanov,  
V. A. Anich, Candidate of Technical Sciences

TITLE: Transparency of liquid-oxygen tank of 1200 litres  
capacity with a vacuum-powder insulation

SOURCE: Trudy Vsesoyuznogo nauchno-issledovatel'skogo instituta  
islucheniya i mashtabirovaniya, Trudy, no. 3,  
Moscow, 1962, Apparaty i mashiny kislorodnykh  
ustroystv, 119-127

The above liquid-oxygen tank is the first industrial  
vessel with vacuum-powder insulation used in serial production in  
the USSR. A detailed description of the tank and all the working  
parameters are given. The weight of the empty tank, when made of  
aluminium, is 70 kg and, when made of steel shell, 115 kg.  
The oxygen losses due to evaporation during storage range from  
0.7 to 1.0 kg/h. The vessel is cylindrical in shape with dia. at  
ends of 940 mm diameter, made in one version of stainless steel  
type 1-13 9 (11.10.7) of 8 to 10 mm thickness. The cylinder  
rests on four supports with the help of four vertical chains  
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S/Doc 762/001/005/0-2/1/2  
Doc 2/492

Transportable ...

attached to the shell; in order to reduce the inertia effects, an electrical fan, the reverse of which is used which connects the vessel with the vacuum supports of the shell. The space between the shell and the vessel is filled with Silicagel (VIU No. Yel-1-1-1) or aerogel 8 (VIU no. Yel-1-1-1) and, after welding the portholes, evacuated down to 1 mm Hg. When filled with liquid oxygen, the pressure drops to 0.1-0.2 mm Hg. The state of vacuum was measured by a thermoelectric valve (VIU no. Yel-1-1-1). The Silicagel was packed in little pockets in the lower part of the vacuum space to prevent the vacuum. All the seams of the vessel and shell were argon-arc welded. The version using an aluminum shell (VIU no. Yel-1-1-1) proved to be very troublesome due to the difficulty of making tight connections between the stainless steel and aluminum. A method was developed for testing for gas leaks and general vacuum in the insulated space. It was found that oxygen losses due to evaporation amounted to 1.3% per 24 hours, i.e. about six times less than for a similar tank insulated with "mipero". The authors have also determined theoretically and experimentally the coefficient of heat reflection through the insulation and through the "heat bridges".

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Transportable liquid nitrogen ...

SI 700/62/00/005/002/00  
1202/13492

The influx of heat through the insulation caused a ...  
70% of the total heat influx passing into the liquid ...  
it has been stated that further reduction in losses due to  
evaporation could be attained only by simultaneous increase in  
insulation efficiency and improvement in the construction of the  
suspensions and supports. A fairly detailed description of the  
auxiliary plant and the working parameters of the tank is also  
given. There are 12 figures.

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